

HABITAT CONSERVATION PLAN
Technical Advisory Committee
September 19, 2006. 9:00 – 11:00 am
Arizona Game and Fish Department Conference Room
555 North Greasewood Road
Tucson, Arizona 85745-3612

MEETING SUMMARY

Attendees:

HCP TAC Members: Guy McPherson, Trevor Hare, Rich Glinski, Ralph Marra, Mima Falk, Sonja Macys, Cathy Crawford

Other Attendees: Lori Anderson (Coalition for Sonoran Desert Protection), David Jacobs (Arizona Attorney General's Office/Arizona State Land Department), Marit Alanen, Ann Phillips and Leslie Liberti (City of Tucson – Office of Conservation and Sustainable Development), Jessica Lee and Geoff Soroka (SWCA)

1) Updates/Upcoming TAC Meetings

a. *Scheduled TAC Meetings:*

- **October 17, 2006, 9:00 – 11:00 AM @ AGFD. ***
- **First and Third Tuesdays, 9:00 – 11:00 AM @ AGFD.**

* The TAC opted to skip the October 3, 2006 meeting.

2) Old Business

a. *September 5, 2006 Meeting Minutes*

Ann explained that the September 5 meeting minutes are not yet available for review, but that they would be sent out soon.

b. *Survey Update*

- *Status on contracts for surveys*

Ann noted that many of the contracts for HCP surveys are in the City Procurement Office, but that they would hopefully get approved soon.

- *Floristic survey proposed by Phil Rosen (University of Arizona)*

Geoff handed out a packet of information, including updates to approved HCP surveys and a new proposal from Phil Rosen, "Southlands and Avra Valley Floristic Study." The survey would be focused on riparian areas and floodways. Geoff reviewed the proposal and noted that the survey would have to be completed by September 25 while the conditions are favorable. The TAC acknowledged that, while the study would be interesting, they feel that the HCP survey money should be spent on the already approved studies. They also concluded that the window of opportunity to conduct the

survey had passed. However, Guy pointed out that many local botanists have been out collecting plants and that it would be worthwhile to contact them and attempt to obtain a species list from them. Geoff agreed to look into this and TAC members provided him names of several individuals to contact. Mima noted that a survey is being conducted in Mexico to evaluate how buffelgrass may be invading Tumamoc globeberry (*Tumamoca macdougalii*) habitat. She noted that it is likely that the species occurs in the Southlands, since it has been found in degraded floodways.

c. Southlands Update

- *Western Burrowing Owl*

Geoff noted that Courtney Conway (University of Arizona) did not get back to him with an update on the burrowing owl surveys in Avra Valley, and that Courtney is concerned because the contract has not been finalized. However, Ann reported that the contract will be finalized soon and she gave a quick update on the status of Courtney's survey.

- *Cactus Ferruginous Pygmy-owl (CFPO)*

Geoff explained that Scott Richardson (USFWS) had agreed with the TAC's approach to mapping CFPO habitat in the expanded Southlands, that most of the area provides at least dispersal habitat for the species. In an email correspondence with Geoff, he noted that a few areas in the northern and southern portions of the expansion area could be considered breeding/nesting habitat (which are detailed in the handout). Leslie recommended that the TAC continue to work with Scott in the future.

- *Mesquite Mouse*

Geoff reviewed the correspondence with Phil Rosen regarding this species. Phil stressed that there are many unanswered questions regarding this species, and has proposed additional trapping and lab analysis, with an estimated cost of \$4,500-6,500. Trevor noted that he feels comfortable pushing back any decisions about funding additional surveys until next fiscal year in order to have adequate money for the other approved HCP surveys. The TAC agreed.

- *Lowland leopard frog and Mexican garter snake*

Geoff reviewed correspondence with Don Swann (Saguaro National Park, SNP). Don provided information on historic and current observations of lowland leopard frog within the Park boundaries, but deferred to Phil Rosen regarding any historic and current distributions of both species in the greater area. The TAC agreed to hold off on lowland leopard frog surveys within the expanded Southlands planning sub-area at this time.

- *Lesser long-nosed bat (LLNB)*

Geoff reviewed correspondence with Scott Richardson regarding LLNB. Scott noted that there are no known roost sites in the expanded Southlands planning sub-area. However, he did note that there could be some potential roost sites based on topography and old mine sites in the far eastern portion of the planning area. He supported the TAC's habitat model approach of including areas with saguaros and agaves as potential foraging

habitat. Riparian areas should also be considered as dispersal habitat. Geoff noted that Scott has drawn a rough map of potential foraging areas. Marit offered to look into whether Scott could provide this map to the TAC. Leslie asked how foraging habitat is evaluated, and if it is based on saguaro and agave densities. Mima explained that no densities have been established, and that the foraging habitat models use a general 40-mile range from known roosting locations. She noted that recent research shows that bats are not necessarily attracted to higher densities of saguaros and agaves, but to other factors that are not clearly understood at this point. Rich noted that he has discussed this issue with Ronnie Sidner (University of Arizona). Her observations demonstrate that LLNB will forage in areas with sparse distributions of agaves and saguaros, not necessarily related to density. Rich noted that, while native landscaping could provide additional foraging opportunities, Ronnie's observations indicate that bats foraging in urban areas experience higher mortality rates (vehicle strikes, disease, cats, etc.). Trevor added that the Rincon Valley contains a high density of both saguaros and agaves. Mima asked Leslie who was scheduled to do the saguaro and agave surveys. Although Marc Baker's name had been suggested at previous meetings, Leslie said that the TAC has not decided yet.

- *Desert Tortoise*

Ann provided an update on the desert tortoise meeting that occurred two weeks ago. She noted that Lori, Cathy, Taylor Edwards (University of Arizona), Derril Tersey (Ironwood National Monument) and Don Swann (Saguaro National Park) attended the meeting. She noted that a long discussion occurred about possible actions to help protect the tortoise. It was noted that it is difficult to create designated dispersal corridors because tortoises tend to disperse randomly, walking in one direction until they meet a barrier, then moving around it. Because preserving genetic diversity requires that just one individual from a population cross into another population each generation, people might have to intervene and move animals between populations. The group felt that education was an important component of protection efforts and that future development does not create additional dispersal obstructions in tortoise habitat. Ann reported that Taylor stressed that it is also crucial to protect existing habitat. Cathy noted that Taylor was presenting updates to his genetic studies on desert tortoise at the Tucson Herpetological Society meeting later that night. Ann said that several action items were discussed at the meeting, including assembling mapping information from all local jurisdictions to specifically identify saguaro habitat on south-facing slopes, collecting available GIS information on caliche layers (tortoise burrows are sometimes found in association with caliche), and the need for ground truthing. Another action item is to identify how to minimize impacts from future developments, for example, looking at different impacts from sparse but uniform development (e.g. 1 RAC) verses clustered development. Trevor noted that there is a lot of research on these topics resulting from studies done with Mohave tortoise populations.

d. Update on Environmental Resource Zone (ERZ) Wash Ordinance

Leslie provided an update on the Environmental Resource Zone (ERZ)/Watercourse, Amenities, Safety and Habitat (WASH) ordinance issue. She noted that current ordinances are not strong and clear, which leads to confusion, and that wash protection has largely been based on the condition of the existing habitat. The Mayor and Council Subcommittee for Environment, Planning and Resource Management provided the

Office of Conservation and Sustainable Development (OCSD) with two types of direction to improve watercourse protection.

First, OCSD is to develop an interim to protect watercourses proposed for designation. Such watercourses will be identified when sites come up for rezonings or Floodplain Use Permits. She noted that Development Services has been adhering to this process for years, but that in general DSD staff members are not trained in how to preserve washes. She explained that Ann would be working with the developers on a case-by-case basis during this interim period to help develop strategies for wash protection. An effort would be made to clarify parts of the ordinance that are not well defined to improve consistency in how regulations are applied.

Second, an Environmentally Sensitive Land Ordinance (ESLO) would be developed to consolidate the ERZ and WASH ordinances and include new information based on the Tucson Stormwater Management Study. She explained that the new Resource Planning Advisory Committee (RPAC) would undertake developing this ordinance. She said the proposed ESLO would evaluate washes not only for existing vegetation, but also for values such as restoration potential. For example, a revegetation program could be developed to improve disturbed washes. However, she noted that this would require a more thorough evaluation of washes within the City. Rich said that it would be interesting to also evaluate washes based on seed sources, in addition to noting current vegetation. Mima added that seed bank studies would be valuable to understanding the natural resource value of the land.

e. Buffelgrass Treatment Update

Ann provided an update, noting that the City would begin spraying herbicide on selected acres in Avra Valley on September 20. She noted that a “buffelgrass summit” is being planned for December 1. Leslie noted that the City would be sending representatives from every department that is involved with buffelgrass. In response to the question posed by the TAC regarding the potential to prohibit fountain grass in Tucson, Ann noted that currently planting olive trees is banned in Pima County due to health concerns related to pollen release, but that there is not a health issue related to fountain grass that would allow this same mechanism to be used. She explained that Desert Survivors is working on compiling data to propose that deciduous tamarisk and fountain grass be designated as noxious weeds in Arizona. Ann noted that Jim Verrier at Desert Survivors would appreciate receiving letters of support for this proposal.

3) New Business

a. Avra Valley Discussion: Develop HCP mitigation strategies using site maps

The TAC spent the rest of the meeting looking at various maps of the Avra Valley planning sub-area. One map, provided by Tucson Water, showed the general locations of potential future water development areas in Avra Valley. The TAC also looked at 1:200 scale orthomaps of Avra Valley parcels, including layers detailing target species habitat, previously noted conservation priority areas, and noted dispersal corridor routes. Leslie handed out a table detailing habitat information, sorted by the same colored coding depicted on the Tucson Water map. This information complemented the packet

she handed out at the previous meeting, detailing the same information by parcel. Ralph noted that the Southern Avra Valley Storage and Recovery Project (SAVSARP) is undergoing individual Section 7 consultation under the Endangered Species Act, and would not be included in the HCP permit area. Leslie noted that the properties colored in gray are slated for potential sale, and are areas that have never been evaluated by the TAC. Ralph stressed that the locations of potential future developments are uncertain, and that the voters and Mayor and Council would provide direction for the department in the future.

The TAC decided to first discuss the northern-most block of properties noted on the Tucson Water map, which included the Simpson Farm and portions of the Santa Cruz River and Brawley Wash. Leslie noted that the yellow lines indicating corridors are a bit arbitrary because they were mapped on a broad scale, and that the TAC has yet to specify the width and configuration of these corridor areas. She suggested that the TAC discuss the development of an avoidance and mitigation strategy, and that they discuss how the City could adequately preserve the habitat and function of the covered species. Mima was asked if the restoration work conducted at the Simpson Farm site by Tucson Audubon Society could be counted as mitigation credits in the HCP, and Mima responded that those efforts could not be counted for HCP mitigation since they are already identified as in-lieu mitigation under CWA Section 404 permits. Ann noted that approximately 170 acres of land are being used for in-lieu mitigation at Simpson Farm. In addition, about 50 acres has been restored using grants from the Arizona Water Protection Fund.

The TAC discussed the potential for burrowing owls in Avra Valley. Leslie noted that impacts to the species' habitat would require mitigation to enhance habitat elsewhere. Rich noted that burrowing owls currently like fallow farmland, and that enhancing these areas might negatively impact them. Rich said that he is in favor of creating burrowing owl management areas (BOMAs) in Avra Valley, and that the TAC would need to discuss how to provide adequate protection. The TAC discussed both the ground snake and Tucson shovel-nosed snake, and noted that one mitigation opportunity could be to protect habitat that previously did not have protection. The TAC discussed why the City is including the two snakes in the HCP, when Pima County is not. Leslie noted that Phil Rosen sees Avra Valley as a potential recovery area for Tucson shovel-nosed snake.

Trevor noted that, in general, he would like to see a greater buffer around all riparian areas in Avra Valley. Ralph noted that, regarding the Martin Farm parcel that contains the Santa Cruz River, the northern portion might be leased to the Town of Marana. This northern portion is outside the riparian area. Mima clarified some questions about mitigation requirements, noting that in the HCP, the City would be required to submit a plan for the conservation strategy. If development were to occur in those designated areas, then a mitigation strategy would need to be developed either within the actual parcel where the impacts occurred, or in other appropriate habitat. In an attempt to evaluate whether adequate protections were achieved, the TAC spent time discussing the percent of habitat captured for each species within the parcel. The TAC discussed how mitigation needs would be calculated. Mima added that calculations for mitigation could only include existing habitat, not potential future habitat that might be achieved through restoration efforts.

The TAC compared the City's captured habitat, by species, with that achieved in the Sonoran Desert Conservation Plan Conservation Land System. Lori suggested to the TAC that they should change their approach on evaluating land in Avra Valley, first focusing on areas that contain less habitat value, and then seeing how many acres Tucson Water might need of the more suitable habitat. Ralph stressed, given the uncertainty it would be prudent to consider all of the City's Avra Valley lands as potentially usable for future water development projects. Leslie stressed that the TAC needs to figure out if the conservation priorities provide adequate protection for each target species. Trevor suggested standardizing a wash buffer and stressed that the TAC should decide on the width of the dispersal corridors in order to maintain connectivity.

The TAC discussed adjacent land uses. Leslie said that most of the surrounding land is unconsolidated Pima County, which is covered by Pima County's biologically sensitive areas or important riparian areas designations. Some of the adjacent land is Tohono O'odham Nation lands and Ironwood Forest National Monument. Trevor added that lands adjacent to the Monument should be given higher consideration for protection in order to maintain a buffer and connectivity, and Rich agreed.

4) Call to the Public

No members of the public spoke up.

5) Next Steps/ Future Meetings

Leslie suggested that the TAC skip the October 3 meeting and reconvene October 17, in order to give the City extra time to pull together resources and to do the analysis that Trevor and Rich requested. The TAC agreed. Ann suggested that the City develop a way to categorize the level of impact expected by proposed developments, in order to evaluate which projects might have greater impacts as they are planned within biologically rich areas.